BARSKA®

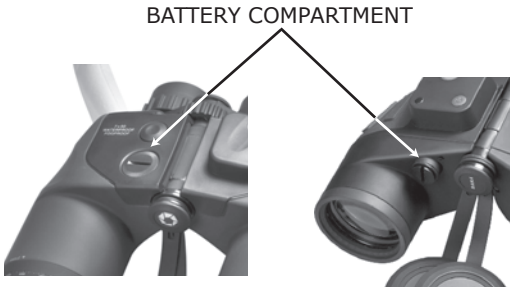
INSTRUCTIONS FOR USE OF INTERNAL RANGEFINDER RETICLE AND DIRECTIONAL COMPASS --- DEEP SEA MODELS AB10160/AB101800 AND AB10798

AB10160 / AB10800

AB10798

1. Installing Batteries

1. Remove rubber cap
2. Remove gold flat cover
3. Insert two (2) batteries (LR43 1.5v) positive (+) side up



2. Using the Directional Compass - The compass scale is in one degree increments. It is aligned with the vertical range finding scale. North is represented as 0°, East as 90°, South as 180° and West as 270°. When using the compass bear in mind the local variation between magnetic North and true North.

Directional Compass

3. Using the Internal Rangefinder Reticle to Determine Height or Width of an Object --- Each short mark on the vertical and horizontal axis of the scale has a value of .5 MIL. Each long mark has a value of 1.0 MIL. To determine the height or width of an object in MILs, center the object on the vertical scale and position the horizontal axis at the bottom of the object. Count the number of MILs on the horizontal or vertical axis to determine the width or height of the object. For example, the lighthouse is 7 MILs high.

Fig. 1 - Internal Rangefinder Reticle and Directional Compass

4. Using the Distance Scale to Determine Distance to the Object --- To determine object's distance using the Distance Scale follow the following steps (Refer to Fig. 2.):

1. Use the Internal Rangefinder Reticle to calculate object size (See Fig.1. example).
2. Rotate the upper ring of the binocular's distance scale and align the number of MILs under the arrow adjacent to ANGLE.
3. Locate the size of the object (MIL number) on the middle scale - OBJECT SIZE.
4. You can now read the distance at which the object is located on the lower scale - DISTANCE - under OBJECT SIZE MIL number notation.

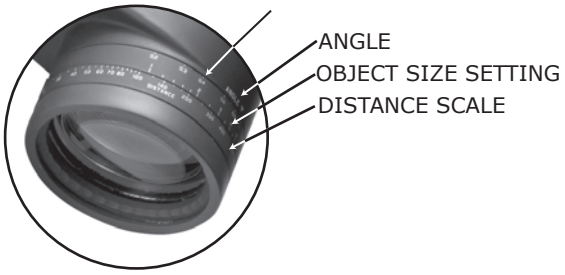


Fig. 2 - Distance Scale

4. Mathematical Formulas for Determining Object Size or Distance to Object --- Use one of the following formulas if you know the size or distance to the object.

1. To calculate the DISTANCE (object size must be determined):

$$\text{Distance} = \frac{100 \times \text{Object Size}}{\text{Rangefinder Scale Reading}}$$

2. To calculate the SIZE (object distance must be determined):

$$\text{Object Size} = \frac{\text{Distance} \times \text{Rangefinder Scale Reading}}{100}$$